WE CLAIM:

1. An indenter for a nanoindentation instrument, comprising: an indentation tip having a centerline and a distal end;

a flat on the distal end of said indentation tip, said flat being substantially perpendicular to said indentation tip centerline; and,

an imaging probe extending from said indentation tip, said imaging probe being disposed substantially parallel to said indentation tip centerline and spaced a distance therefrom.

2. An indenter for a nanoindentation instrument, comprising: an indentation tip having a centerline and a distal end;

a flat on the distal end of said indentation tip, said flat being substantially perpendicular to said indentation tip centerline; and,

an imaging probe extending from said indentation tip, said imaging probe being disposed substantially parallel to said indentation tip centerline and spaced a distance therefrom, said imaging probe extending beyond said flat.

3. An indenter for a nanoindentation instrument, comprising: an indentation tip having a centerline and a distal end;

a flat on the distal end of said indentation tip, said flat being substantially perpendicular to said indentation tip centerline, said flat forming a compression platen; and,

an imaging probe extending from said distal end of said indentation tip, said imaging probe being disposed substantially parallel to said indentation tip centerline and spaced a distance therefrom.